



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|---------------------------|-------------|----------------------|---------------------|------------------|
| 10/720,119 | 11/25/2003 | Robert C. Knauerhase | 42339-191615 | 4372 |
| 26694 | 7590 | 06/04/2007 | | |
| VENABLE LLP | | | EXAMINER | |
| P.O. BOX 34385 | | | ABEDIN, SHANTO | |
| WASHINGTON, DC 20043-9998 | | | | |
| | | | ART UNIT | PAPER NUMBER |
| | | | 2136 | |
| | | | MAIL DATE | DELIVERY MODE |
| | | | 06/04/2007 | PAPER |

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

| | | | |
|------------------------------|--------------------------------------|--|--|
| Office Action Summary | Application No. 10/720,119 | Applicant(s) KNAUERHASE ET AL. | |
| | Examiner Shanto M Z Abedin | Art Unit 2136 | |

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 03 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 25 November 2003.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-28 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-28 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

1. This office action is in response to the communication filed on 11/25/2003.
2. Claim 1-28 are currently presented for the examination.
3. Claim 1-28 have been rejected.

Specification

Applicant is reminded of the proper language and format for an abstract of the disclosure.

The abstract should be in narrative form and generally limited to a single paragraph on a separate sheet within the range of 50 to 150 words. It is important that the abstract not exceed 150 words in length since the space provided for the abstract on the computer tape used by the printer is limited. The form and legal phraseology often used in patent claims, such as "means" and "said," should be avoided. The abstract should describe the disclosure sufficiently to assist readers in deciding whether there is a need for consulting the full patent text for details.

The language should be clear and concise and should not repeat information given in the title. It should avoid using phrases which can be implied, such as, "The disclosure concerns," "The disclosure defined by this invention," "The disclosure describes," etc.

4. The abstract of the disclosure is objected to because abstract fails to disclose the claimed invention clearly and properly, instead it merely discloses the subject matter of one of the independent claims. Furthermore, abstract recite the quoted word "transferred" which is objectionable - the word "transferred" should be clearly and concisely explained in the abstract if it carries any other meanings than dictionary meanings of the word "transferred". Correction is required. See MPEP § 608.01(b).

Claim Rejections - 35 USC § 101

35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

5. Claims 12-19 and 25-28 are rejected under 35 USC 101 as the claimed invention is being directed to non-statutory subject matter.

Regarding claims 12-19 and 25-28, they recite the limitation "machine readable medium" that comprises propagated signals and carrier waves (as disclosed in specification, Par [0012]) which are non-statutory subject matter. See MPEP 2106.01 [R-5].

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

6. Claims 1-28 are rejected under 35 USC 102 (b) as being anticipated by TRAW et al (US 2002/0007452A1).

Regarding claim 1 and 12, TRAW et al discloses method/ machine readable medium, comprising:

a) transmitting and receiving data with a second device via a first communication link to a first device to establish an identity of the first device (Fig 2,5; Par [0009], [0039], [0077]; identity/ random challenge/ certificates/ key exchange procedure to establish identity for the devices; establishing control channels; secure background links/channels); and

b) using the established identity for authentication of communications from the first device received by the second device via a second communication link (Fig 2, 8; Par [0039], [0047]; starting at par [0077], [0108]; creating an encrypted content channel for protected content once secure control channel is established).

Regarding claim 20, TRAW et al discloses an apparatus comprising:

a first module adapted to establish an identity of a client device to a server via at least a first communications link (Fig 8; starting at Par [0042]; starting at Par [0077]; starting at Par [0120]; starting at Par [0131]; key exchange or random challenge or certificates exchange/ matching for establishing identity) and

a second module adapted to authenticate the client device on another communication link based on established identity (starting at Par [0042]; Par [0077], [0120]; starting at Par [0131]; device authentication)

Regarding claim 25, TRAW et al discloses machine readable medium that provides instructions, when executed by a computing platform, cause said computing platform to perform operations comprising a method of:

transmitting and receiving data with a client via a first communication link to a server to establish an identity of the client (Fig 8; starting at Par [0042]; starting at Par [0077]; starting at Par [0120]; starting at Par [0131]; key exchange or random challenge or certificates exchange/ matching for establishing identity; using proxies); and

transmitting and receiving data with the client via a second communication link between the client and the server using the established identity (starting at Par [0042]; Par [0077], [0120]; starting at Par [0131]; device authentication; proxy server authentication).

Regarding claim 2, TRAW et al discloses the method further comprising transferring the established identity to the second communication link (Fig 2; Par [0039],[0047], [0077], [0108]; Claim 1, 5; transferring content/ information in content channel once authentication is completed in

control channel; therefore, device authentication established in control channel is used to communicate over content channel).

Regarding claim 3, TRAW et al discloses the method comprising sending a nonce to the first device via the first communication link; and receiving at the second device at least one of the nonce and a function of the nonce from the first device via the second communication link (Fig 3(a), 3(B); Par [0010], starting at [0080]; using random challenges/ hash functions/ certificates for authentication).

Regarding claim 4, TRAW et al discloses the method further comprising encrypting the nonce at the second device for the first device (Fig 3(a), 3(B); Par [0010], starting at [0081]; Claim 1, 10; encrypted random challenges).

Regarding claim 5, TRAW et al discloses the method further comprising: receiving a nonce at the first device via the first communication link; and sending at least one of the nonce and a function of the nonce from the first device via the second communication link (Fig 3(a), 3(B); Par [0010], starting at [0081]).

Regarding claim 6, TRAW et al discloses the method further comprising: determining an optimal communication link from a plurality of communications links between the first device and second device; and using the established identity for communication between the first device and the

Art Unit: 2136

second device via the optimal communication link (Fig 2, 8; Col 6, starting at par [0077]; selecting from plurality of the background/ front communication channels).

Regarding claim 7, TRAW et al discloses the method further comprising:

periodically sending a nonce from the second device via the first communication link to the first device (Par [0105], [0110]; periodic or regular basis update/ authentication of the control channel keys); and

maintaining the second communication link with the first device only if a response to the nonce is received from the first device via the second communication link (starting at Par [0083]; Par [0110]; Claim 1; matching random challenges/ keys to values; maintaining/ canceling communication) .

Regarding claim 8, TRAW et al discloses the method wherein b) comprises: determining an address of the first device; and authenticating communications received from the address as being from the first device (Par [0025], [0080], [0128]; device specific information/ id / certificates).

Regarding claim 9, TRAW et al discloses the method wherein b) comprises:

transmitting security credentials from the second device to the first device via the first communications link (starting at Par [0081]; transmitting shared secret key; Page 5, starting at Par [0098]; transmitting signature/ certificates); and

identifying communications that utilize the security credentials received at the second device over the second communications link as being from the same first device (starting at Par [0081]; transmitting/ exchanging keys/ challenges ; starting at Par [0098]).

Regarding claim 10, TRAW et al discloses the method further comprising:

receiving the security credentials at the first device (starting at Par [0081]; transmitting shared secret key; Page 5, starting at Par [0098]; transmitting signature/ certificates);

encrypting data using the security credentials (Par [0010], starting at [0081]; Claim 1, 10; encrypted random challenges); and

sending the encrypted data via the second communications link (Page 4, starting at Par [0081]; Page 5, starting at Par [0098]; transmitting encrypted contents).

Regarding claim 11, TRAW et al discloses the method further comprising decrypting encrypted data received via the second communications link at the second device in order to identify the first device (Par [0045], [0125]).

Regarding claims 13-19, they recite the limitations of claims 1-12, therefore, they are rejected applying as above rejecting claims 1-12.

Regarding claims 21-24 and 26-28, they recite the limitations of claims 1-11, 20 and 25, therefore, they are rejected applying as above rejecting claims 1-11, 20 and 25.

Conclusion

7. A shortened statutory period for response to this action is set to expire in 3 (Three) months and 0 (Zero) days from the mailing date of this letter. Failure to respond within the period for response will result in ABANDONMENT of the application (see 35 U.S.C 133, M.P.E.P 710.02(b)).

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Shanto M Abedin whose telephone number is 571-272-3551. The examiner

Art Unit: 2136


can normally be reached on M-F from 9:00 AM to 5:30 PM. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Moazzami Nasser, can be reached on 571-272-4195. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Shanto M Abedin

Examiner, AU 2136

NASSER MOAZZAMI
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 2100


5,26,07